ABSTRACT

A variable reluctance analog position device designed to determine the position variation of a target made from a ferromagnetic material. The device includes at least one magnet, the target and the magnet defining a gap therebetween. A magnetosensitive element detects induction variation produced in the gap by relative movement of the target relative to the magnet. The magnet is magnetized in a direction essentially perpendicular to the front surface of the magnet, which defines one edge of the gap. The magnet includes a cavity open at the front surface thereof and the magnetosensitive element is housed in the cavity. Moreover, the target is provided with a specific geometric configuration determined such that the induction variation according to the position of the target corresponds to a pre-defined function.